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For Grants and Contracts

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The NIH Guide announces scientific initiatives and provides policy and administrative information to individuals and organizations who need to be kept informed of opportunities, requirements, and changes in extramural programs administered by the National Institutes of Health.

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NOTICES

SUPPORT OF SCIENTIFIC MEETINGS BY THE NATIONAL CANCER INSTITUTE 1
National Cancer Institute
Index: CANCER

NOTICES OF AVAILABILITY (RFPs AND RFAs)

A RESEARCH RESOURCE OF BB/W RATS (RFP) 1
National Institute of Diabetes and Digestive and Kidney Diseases
Index: DIABETES, DIGESTIVE DISEASES, KIDNEY DISEASES

CULTIVATION OF CYANOBACTERIA (BLUE-GREEN ALGAE) (RFP) 1
National Cancer Institute
Index: CANCER

PLANNING GRANTS FOR PROSPECTIVE CANCER CENTERS (RFA CA-91-15) 2
National Cancer Institute
Index: CANCER

ONGOING PROGRAM ANNOUNCEMENTS

RESEARCH ON THE ETIOLOGY AND PATHOPHYSIOLOGY, NATURAL HISTORY AND OPTIMAL THERAPY OF ASYMPTOMATIC PRIMARY HYPERPARATHYROIDISM (PA-91-45) 4
National Institute of Diabetes and Digestive and Kidney Diseases
Index: DIABETES, DIGESTIVE DISEASES, KIDNEY DISEASES

IMPLEMENTATION OF THE NATIONAL PLAN FOR RESEARCH ON CHILD AND ADOLESCENT MENTAL DISORDERS (PA-91-46) 8
National Institute of Mental Health
Index: MENTAL HEALTH

SPECIAL EMPHASIS RESEARCH CAREER AWARD: THE DEMOGRAPHY AND ECONOMICS OF AGING (PA-91-47) 13
National Institute on Aging
Index: AGING

INDIVIDUAL POSTDOCTORAL NATIONAL RESEARCH SERVICE AWARD FELLOWSHIPS IN RADIOLOGICAL SCIENCES RELATED TO CANCER (PA-91-48) 18
National Cancer Institute
Index: CANCER

NOTICES

SUPPORT OF SCIENTIFIC MEETINGS BY THE NATIONAL CANCER INSTITUTE

P.T. 42; K.W. 1014006

National Cancer Institute

Prospective applicants interested in seeking support of scientific meetings from the National Cancer Institute (NCI) are reminded that as of October 1, 1989, all grant application submissions for support of meetings must adhere to the Division of Research Grants (DRG) regular receipt dates of February 1, June 1, and October 1. These dates are published by DRG in the information and instructions form of the PHS 398 (revised 10/88) application and the booklet on "Support of Scientific Meetings," August 1988.

Applications received late will be returned or held for the next regular review cycle if the proposed meeting date permits. Waiver of the receipt date(s) will be considered only for exceptional circumstances. Requests must be submitted as instructed in the above referenced booklet and may be obtained from the Office of Grants Inquiries, DRG, at the address below. Specific questions regarding the NCI conference grant program should be directed to the NCI Conference Grant Coordinator at (301) 496-7173.

Office of Grants Inquiries
Division of Research Grants
Westwood Building, Room 449
Bethesda, MD 20892
Telephone: (301) 496-7441

NOTICES OF AVAILABILITY (RFPs AND RFAs)

A RESEARCH RESOURCE OF BB/W RATS

RFP AVAILABLE: NIH-NIDDK-91-4

P.T. 34; K.W. 1002002, 0201016

National Institute of Diabetes and Digestive and Kidney Diseases

The National Institute of Diabetes and Digestive and Kidney Diseases (NIDDK) is seeking an organization to continue a centralized and stable source of supply of the BB/W diabetic rat model and to continue the development of genetically homogeneous familial lines with and without the diabetic defect.

This is a recompetition of contract no. NO1-DK-72287, currently held by the University of Massachusetts.

The NIDDK expects to make one award from this solicitation.

This Request for Proposals (RFP) No. NIH-NIDDK-91-4, will be issued on or about May 1, 1991, with a closing date of July 1, 1991. To receive a copy of this RFP, please supply this office with two self-addressed mailing labels and cite the RFP number referenced above. Requests must be in writing and addressed to:

Shirley A. Shores
Contracts Management Branch
National Institute of Diabetes and Digestive and Kidney Diseases
Westwood Building, Room 602
Bethesda, MD 20892

This advertisement does not commit the Government to make an award.

CULTIVATION OF CYANOBACTERIA (BLUE-GREEN ALGAE)

RFP AVAILABLE: NCI-CM-27715-72

P.T. 34; K.W. 0780005, 1002027

National Cancer Institute

The National Products Branch (NPB), Developmental Therapeutics Program (DTP), Division of Cancer Treatment (DCT), National Cancer Institute (NCI), has a

requirement to isolate and grow various species of cyanobacteria to provide NCI with a repository of cell extracts for use in new screens for antitumor/anti-AIDS activities. It is anticipated that one (1) cost-reimbursement type contract will be awarded for a five-year, incrementally funded period of performance. A completion form of contract is planned.

To be considered for this contract, offerors must show evidence of capability to isolate and cultivate cyanobacteria as well as possess the expertise to accomplish: maintenance and preservation of cultures, optimization and scale-up of production, extraction of cells, and concentration of extracts. The project will require that approximately 300 different axenic cultures and 700 culture equivalents be grown to obtain 1.5 to 5G cyanobacteria cell extracts. The contractor may be required by NCI to scale-up cultivation of certain cultures to produce 20G to 40G of cell extracts. This may be subcontracted. The Principal Investigator (PI) should be trained in microbiology or phycology, preferrably at the Ph.D. level or equivalent from an accredited school, and have at least three to five years experience in the proposed area. The PI should have a broad knowledge of culture cultivation, particularly in those areas related to growing cyanobacteria, cyanobacteria taxonomy, sample preparations, or related fields. The PI should be assigned to the project for a minimum of 50 percent of the time. The level of training of the team members should reflect their assigned duties, and they should have experience in taxonomy, culture isolation and preservation, culturing of cyanobacteria, and chemical extraction.

RFP No. NCI-CM-27715-72 may be requested from Ms. Jacqueline Ballard, Contract Specialist, on or about May 15, 1991, and proposals will be due on July 3, 1991.

The proposed contract project represents a recompetition of contract no. N01 CM-67745, currently held by the University of Hawaii at Manoa.

All written requests should be directed to:

Ms. Jacqueline Ballard
Contracting Officer's Representative
National Institutes of Health
National Cancer Institute
Research Contract Branch, TCS
Executive Plaza South, Room 603
9000 Rockville Pike
Bethesda, MD 20892

PLANNING GRANTS FOR PROSPECTIVE CANCER CENTERS

RFA AVAILABLE: CA-91-15

P.T. 04; K.W. 0715035, 0745027, 0795003, 0403004

National Cancer Institute

Letter of Intent Receipt Date: July 15, 1991
Application Receipt Date: August 28, 1991

I. INTRODUCTION

The Cancer Centers Branch (CCB) of the Division of Cancer Biology, Diagnosis and Centers (DCBDC) of the National Cancer Institute (NCI) announces the availability of planning and development grants for the purpose of assisting eligible institutions develop the organizational capability that will lead to the formation and/or development of cancer research centers of excellence. The goal of this Request for Applications (RFA) initiative is to encourage the development of clinical and consortium cancer research centers in geographic areas that currently are not served by existing NCI-designated clinical or comprehensive cancer centers. In addition to basic cancer research, these new centers should plan to emphasize clinical and prevention/control research that will ultimately impact on the populations in their regions. It is anticipated that after completion of these planning and development grants, recipient institutions will be in a position to compete for Cancer Center Support Grants from the NCI.

The Public Health Service (PHS) is committed to achieving the health promotion and disease prevention objectives of "Healthy People 2000", a PHS-led national activity for setting priority areas. This RFA is related to the priority area of cancer. Potential applicants may obtain a copy of "Healthy People 2000" (Full Report: Stock No. 017-001-00474-0) or "Healthy People 2000" (Summary

Report: Stock No. 017-001-00473-1) through the Superintendent of Documents, Government Printing Office, Washington, D.C. 20402-9325 (telephone 202-783-3238).

II. ELIGIBILITY REQUIREMENTS

Applicant institutions must intend to develop clinical or consortium cancer centers. Eligible institutions must be in states that do not currently have an NCI-designated Comprehensive, Clinical, or Consortium Cancer Center, and must be located beyond a reasonable distance from an existing Comprehensive, Clinical, or Consortium Cancer Center. In addition, eligible institutions must have three or more externally funded, peer-reviewed, cancer research project grants or contracts (e.g., R01, P01, N01, U01), or equivalent types of research projects. At this time, the Cancer Centers Branch defines peer-reviewed cancer research projects as NCI research grants and contracts, American Cancer Society research project grants, and other NIH and the National Science Foundation (NSF) research grants that meet the NCI referral guidelines for cancer-related research. Questions concerning the NCI referral guidelines should be addressed to the individual noted in Section IV of this announcement.

Eligible institutions should require approximately three years of support under a planning and development grant to develop the institutional capability to form and or develop a cancer research center of excellence. Institutions that already have an established organizational capability as a cancer center and a sufficient peer-reviewed cancer research base are not eligible under this program. Potential applicants are strongly advised to contact NCI program staff of the Cancer Centers Branch to discuss eligibility prior to preparing an application (see section V below).

III. MECHANISM OF SUPPORT

Support of this program will be through the National Institutes of Health (NIH) grant-in-aid. The exploratory grant mechanism, designated P20, will be used. Applicants will be responsible for the planning, direction, and execution of the proposed project. Except as otherwise stated in the RFA, awards will be administered under PHS grants policy as stated in the Public Health Service Grants Policy Statement, DHHS Publication No. (OASH 90-50,000, revised October 1,1990)

Approximately $750,000 in total costs per year will be committed specifically to fund applications submitted in response to this RFA. It is anticipated that three to five awards will be made. This funding level is dependent upon the receipt of a sufficient number of applications of high merit. The total project period for applications submitted in response to the present RFA should not exceed three years. The earliest feasible start date for the initial awards will be August 1, 1992. Although this program is provided for in the financial plans of the NCI, the award of grants pursuant to this RFA is also contingent upon the availability of funds for this purpose.

IV. LETTER OF INTENT

Although a letter of intent is not required, is not binding, and does not enter into the review of a subsequent application, it is requested in order to provide an indication of the number and scope of applications to be reviewed. Prospective applicants are requested to submit, by July 15, 1991, a letter of intent that includes a descriptive title of the proposed cancer center, the name, address, and telephone/fax number of the planning director (Principal Investigator), the names of other key personnel, the participating institutions, and the number and title of this RFA.

Prospective applicants are strongly encouraged to contact the NCI staff listed below before the submission of a letter of intent and/or an application. Such contact is advantageous to the prospective applicant because it will start a dialogue with the NCI staff where issues such as eligibility requirements and application procedures may be discussed. The letter of intent is to be sent to:

Dr. Alan A. Schreier
Program Director
Cancer Centers Branch
Division of Cancer Biology, Diagnosis and Centers
National Cancer Institute
Executive Plaza North, Room 308
Bethesda, MD 20892
Telephone: (301) 496-8531

V. INQUIRIES

The complete text of the RFA, containing the application procedures that must be used and the review criteria, may be obtained from the Cancer Centers Branch, NCI, at the above address. It may also be obtained through the NIH Guide to Grants and Contracts (computer version). Written and telephone inquiries concerning the objectives, scope, application procedures, and allowable budget items for this RFA or inquiries about whether specific proposals would be responsive are encouraged and should be directed to the Cancer Centers Branch, NCI, program officer listed above. The Branch staff welcomes the opportunity to clarify any issues or questions from potential applicants. In addition, questions of a more administrative nature not directly related to the programmatic aspects of this RFA may be directed to the Grants Administration Branch official listed below.

Ms. Francis Cohen
Grants Specialist
Grants Administration Branch
National Cancer Institute
Executive Plaza South, Room 242
Bethesda, MD 20892
Telephone: (301) 496-7800, ext. 42

ONGOING PROGRAM ANNOUNCEMENTS

RESEARCH ON THE ETIOLOGY AND PATHOPHYSIOLOGY, NATURAL HISTORY AND OPTIMAL THERAPY OF ASYMPTOMATIC PRIMARY HYPERPARATHYROIDISM

PA: PA-91-45

P.T. 34; K.W. 0705030, 0755030, 0765033, 0765035

National Institute of Diabetes and Digestive and Kidney Diseases

PURPOSE

The National Institute of Diabetes and Digestive and Kidney Diseases (NIDDK) invites investigator-initiated research grant applications to develop information on asymptomatic hyperparathyroidism (HPT). Research is solicited on the pathogenesis of this condition, its effects at the cellular and molecular levels, and its effects on the skeletal, neuromuscular, renal, cardiovascular, gastrointestinal and central nervous systems. Of particular interest are studies to compare the long-term consequences of asymptomatic HPT with and without surgical treatment and/or to identify predictive factors to distinguish patients who will ultimately develop complications from this disorder.

DISCIPLINES AND EXPERTISE

Interdisciplinary approaches may be needed for these studies with expertise required in several of the following areas: molecular and cellular biology, endocrinology, gerontology, nephrology, gastroenterology, neurology, psychiatry, radiology, epidemiology, and biostatistics.

BACKGROUND

Widespread use of multiphasic screening tests has resulted in increased detection of hypercalcemia and subsequent diagnosis of HPT. This has now been recognized as a relatively common disorder, with approximately 100,000 new cases per year in the United States, primarily among women. Screening has revealed a significant new population of patients in whom symptoms and signs are subtle or absent. Although surgery is clearly indicated for patients with overt manifestation of HPT, optimal management of the asymptomatic form of HPT is uncertain. Information is now becoming available on the natural history of asymptomatic HPT. This information was evaluated at a recent Consensus Development Conference on Diagnosis and Management of Asymptomatic Primary Hyperparathyroidism held at the NIH (October 29-31, 1990). In addition to developing guidelines for diagnosis and management of this condition based on currently available information, the Consensus Development panel identified a number of areas in which additional research is needed.

OBJECTIVES

This solicitation is intended to stimulate research that will result in new understandings of the etiology and pathogenesis of asymptomatic HPT and its pathophysiology, and the complications associated with chronic elevation of

parathyroid hormone levels. Ultimately a multicenter, randomized controlled trial of sufficient size and duration to assess and compare the long-term outcomes of medical followup and surgical therapy of asymptomatic HPT will be needed to establish the optimal management of this condition. Research is sought to establish feasibility of and to develop strategies for such full-scale clinical trials of the management of asymptomatic HPT.

SCOPE

Some examples of research topics which would be considered responsive to this solicitation include the following:

- o basic studies on the molecular and cellular pathophysiology of HPT
- o etiology of HPT and pathogenesis of parathyroid adenomas and hyperplasia
- o the role of the multiple endocrine neoplasia (MEN) Type I gene in abnormal parathyroid function in MEN and sporadic HPT
- o identification of predictive factors to distinguish subpopulations of patients who will develop adverse effects of mild HPT
- o multisystem effects of HPT, particularly effects on neuromuscular, psychological, cardiovascular and gastrointestinal parameters, and the reversibility of these complications with surgery. [A possible approach would be case control studies before and after surgery in patients with HPT and carefully matched controls undergoing other elective surgical procedures such as thyroidectomy]
- o the effects of asymptomatic HPT on bone mass and structure and correlation of these effects with changes in bone strength and susceptibility to fracture
- o optimal methodology for monitoring changes in bone mass in patients with asymptomatic HPT
- o epidemiologic studies to identify conditions associated with HPT
- o development of potential animal models for study of pathogenesis and therapy of asymptomatic HPT
- o development and study of pharmacologic agents potentially useful in HPT, such as antagonists of PTH synthesis, secretion and end organ effects, as well as effects of estrogen in HPT
- o other studies to provide guidance in designing and establishing the feasibility of a large randomized multicenter clinical trial comparing surgery and medical management of asymptomatic HPT
- o clinical trials comparing bone mass outcomes and biochemical measures of bone turnover in postmenopausal women with HPT randomly assigned to estrogen plus surgery versus estrogen alone

These areas of interest are not listed in any order or priority. They are only suggested examples of areas of research. Applicants are encouraged to propose other areas which are related to the objectives and scope described above.

SPECIAL INSTRUCTIONS TO APPLICANTS REGARDING IMPLEMENTATION OF NIH POLICIES CONCERNING INCLUSION OF WOMEN AND MINORITIES IN CLINICAL RESEARCH STUDY POPULATIONS

NIH and ADAMHA policy is that applicants for NIH/ADAMHA clinical research grants and cooperative agreements will be required to include minorities and women in study populations so that research findings can be of benefit to all persons at risk of the disease, disorder or condition under study; special emphasis should be placed on the need for inclusion of minorities and women in studies of diseases, disorders and conditions which disproportionately affect them. This policy is intended to apply to males and females of all ages. If women or minorities are excluded or inadequately represented in clinical research, particularly in proposed population-based studies, a clear compelling rationale should be provided.

The composition of the proposed study population must be described in terms of gender and racial/ethnic group. In addition, gender and racial/ethnic issues should be addressed in developing a research design and sample size appropriate for the scientific objectives of the study. This information

should be included in the form PHS 398 in Section 2, A-D of the Research Plan AND summarized in Section 2, E, Human Subjects. Applicants/offerors are urged to assess carefully the feasibility of including the broadest possible representation of minority groups. However, NIH recognizes that it may not be feasible or appropriate in all research projects to include representation of the full array of United States racial/ethnic minority populations (i.e., Native Americans (including American Indians or Alaskan Natives), Asian/Pacific Islanders, Blacks, Hispanics).

The rationale for studies on single minority population groups should be provided.

For the purpose of this policy, clinical research includes human biomedical and behavioral studies of etiology, epidemiology, prevention (and preventive strategies), diagnosis, or treatment of diseases, disorders or conditions, including but not limited to clinical trials.

The usual NIH policies concerning research on human subjects also apply. Basic research or clinical studies in which human tissues cannot be identified or linked to individuals are excluded. However, every effort should be made to include human tissues from women and racial/ethnic minorities when it is important to apply the results of the study broadly, and this should be addressed by applicants.

For foreign awards, the policy on inclusion of women applies fully; since the definition of minority differs in other countries, the applicant must discuss the relevance of research involving foreign population groups to the United States' populations, including minorities.

If the required information is not contained within the application, the application will be returned.

Peer reviewers will address specifically whether the research plan in the application conforms to these policies. If the representation of women or minorities in a study design is inadequate to answer the scientific question(s) addressed AND the justification for the selected study population is inadequate, it will be considered a scientific weakness or deficiency in the study design and will be reflected in assigning the priority score to the application.

All applications for clinical research submitted to NIH are required to address these policies. NIH funding components will not award grants or cooperative agreements that do not comply with these policies.

MECHANISM OF SUPPORT

The mechanism of support for this program will be the grant-in-aid via the research project grant (R01). The regulations (Code of Federal Regulations, Title 42, Part 52 and, as applicable to the State and local governments, Title 45, Part 74) and policies which govern the research grant programs of the National Institutes of Health will prevail. Support for this solicitation is contingent upon receipt of appropriated funds. Since a variety of approaches would represent valid responses to this solicitation, it is anticipated that there will be a range of costs among individual grants awarded. With respect to post-award administration, the current policies and requirements that govern the regular research grant programs of the NIH will prevail.

ELIGIBILITY

All domestic public or private, for-profit or non-profit institutions or organizations are eligible to apply in response to this program announcement. Awards in connection with this announcement will be made to foreign institutions only for research of very unusual merit, need, and promise, and in accordance with Public Health Service policy governing such awards.

Applicants from institutions that have a General Clinical Research Center (GCRC) funded by the NIH National Center for Research Resources may wish to identify the GCRC as a resource for conducting the proposed research. In such a case, a letter of agreement from either the GCRC program director or Principal Investigator may be included with the application.

REVIEW PROCEDURES AND CRITERIA

Assignment of applications

Applications will be received by the NIH, Division of Research Grants (DRG), referred to an appropriate Initial Review Group (IRG) for scientific merit review, and assigned to individual Institutes for possible funding. Referral

decisions will be governed by normal programmatic considerations as specified in the Referral Guidelines of the NIH, DRG. Some applications may receive dual assignment.

Review procedures

Applications in response to this solicitation will be reviewed on a nationwide basis in accord with the usual NIH peer review procedures. Applications will be reviewed first for scientific and technical merit by an IRG composed primarily of non-Federal scientific consultants, and then by the National Advisory Council of the appropriate Institute(s). The review criteria customarily employed by the NIH for regular grant applications will prevail.

Review criteria

The factors to be considered in the evaluation of scientific merit of each application will be those used in the review of traditional research project grant applications, including the novelty, originality, and feasibility of the approach; the training, experience, and research competence of the investigator(s); the adequacy of the experimental design; the suitability of the facilities; and the appropriateness of the requested budget to the work proposed.

METHOD OF APPLYING

Format for applications

Applications must be submitted on form PHS 398 (rev. 10/88), which is available from an applicant institution's Office of Sponsored Research or from the NIH DRG. Use the conventional format for research project grant applications and ensure that the points identified in this PA in the section on "Review Procedures and Criteria" are fulfilled. To identify the application as a response to this PA, check "yes" on item two of page one of the application and enter the title "Asymptomatic Primary Hyperparathyroidism" and the PA number PA-91-45.

Deadline

Applications will be accepted in accordance with the announced receipt dates for new applications - February 1, June 1, and October 1.

Application procedure

The original and six copies of the application should be sent or delivered to:

Application Receipt Office
Division of Research Grants
National Institutes of Health
Westwood Building, Room 240
Bethesda, MD 20892**

Inquiries

For further information, investigators are encouraged to contact the following program official:

Ronald N. Margolis, Ph.D.
Director, Endocrinology Research Program
Division of Diabetes, Endocrinology and Metabolic Diseases
NIDDK/NIH
Westwood Bldg, Room 605
Bethesda, MD 20892
Telephone: (301) 496-7504

For fiscal and administrative matters, contact:

Mr. Bruce Butrum
Grants Management Specialist
National Institute of Diabetes and Digestive and Kidney Diseases
Westwood Building, Room 647-D
Bethesda, MD 20892
Telephone: (301) 496-7467

This program is described in the Catalog of Federal Domestic Assistance 93.847, Diabetes, Endocrinology, and Metabolic Diseases. Awards will be made under the authority of the Public Health Service Act, Title III, Section 301 (Public Law 78-410, as amended; 42 USC 241) and administered under PHS grant policies and Federal Regulation 42 CFR Part 52 and 45 CFR Part 74. This

program is not subject to the intergovernmental review requirements of Executive Order 12372 or Health Systems Agency review.

IMPLEMENTATION OF THE NATIONAL PLAN FOR RESEARCH ON CHILD AND ADOLESCENT MENTAL DISORDERS

PA: PA-91-46

P.T. 34, AA; K.W. 0715129, 0403001, 0404020

National Institute of Mental Health

BACKGROUND

At least 7.5 million children and adolescents in the United States suffer from some sort of mental disorder (about 12 percent of the Nation's youth). Although children under age 18 comprise about one-quarter of the Nation's population, the knowledge base required to successfully treat or prevent mental disorders in children has been slow to develop. In part, these difficulties may stem from the lack of awareness of the public and the scientific community of the research needs in this area, the shortage of qualified investigators, and the lack of a coherent national strategy to address the critical research problems. As a result, progress in mental health research on child and adolescent disorders has not kept pace with related research in adults.

The Public Health Service (PHS) is committed to achieving the health promotion and disease prevention objectives of "Healthy People 2000", a PHS-led national activity for setting priority areas. This program announcement, "Implementation of the National Plan for Research on Child and Adolescent Mental Disorders" is related to the priority area of mental health in children and adolescents. Potential applicants may obtain a copy of "Healthy People 2000" (Full Report: Stock No. 017-001-00474-0) or "Healthy People 2000" (Summary Report: Stock No. 017-001-00473-1) through the Superintendent of Documents, Government Printing Office, Washington, D.C. 20402-9325 (telephone 202-783-3238).

Meeting these challenges requires a two-pronged approach that both addresses critical research needs and builds the Nation's research capacity. Under this program announcement, the National Institute of Mental Health (NIMH) seeks to expand the full spectrum of research related to child and adolescent mental disorders, with special focus in the following areas:

- the epidemiology of child and adolescent mental disorders and other associated mental health problems;
- the determination of optimal approaches for defining, assessing, and diagnosing mental disorders and related conditions in children and adolescents;
- basic neuroscience and behavioral research that clarifies the developmental origins, dynamics, and characteristics of mental disorders and suggests new avenues for overcoming them;
- the determination of effective treatment techniques and preventive interventions for mental disorders;
- clinical services research and service systems research to evaluate and improve the efficacy, organization, delivery, and accessibility of treatment and prevention services to young people with mental disorders; and
- research with special applicability to children, including the impact of developmental factors on mental disorders in children, the joint effects of environment and biology in modulating children's behavior, and comorbidity.

Four types of applications focusing on research on child and adolescent mental disorders are encouraged:

- regular research grants (R01);
- small grants (R03);
- program project grants (P01); and
- FIRST awards (First Independent Research Support and Transition award - R29).

Capacity Building: In addition to encouraging increased research, NIMH seeks to expand the Nation's scientific capacity to conduct research in child and adolescent mental disorders by enlarging the supply of well-trained investigators and by fostering the evolution of multidisciplinary research centers. These capacity-building strategies are essential in order to sustain and accelerate the scientific progress that is urgently needed.

Six types of applications focused specifically on child and adolescent mental disorders are encouraged:

- centers (P50);
- institutional research training grants (T32);
- individual fellowships (F30, F31, F32);
- research career awards (K02, K05, K20, K21);
- academic awards (K07); and
- training and career development grants for minority students and faculty (T34, F34).

Although these specific mechanisms should greatly enhance the Nation's child and adolescent mental health research capacity, these mechanisms alone may not be sufficient to ensure a vibrant and growing research infrastructure. Therefore, NIMH encourages experienced researchers who apply for research funding (small grants, regular research grants, program projects, and centers) to involve persons with less research experience (e.g., predoctoral and medical students and experienced clinicians) at appropriate points within their research applications. Systematic efforts in this regard may attract individuals into research at an early point in their careers. Likewise, as experienced researchers form research collaborations with experienced clinicians, better access to populations of interest, increased relevance of research to pressing clinical questions, and increased appreciation by clinicians of the importance of research should result.

DEVELOPMENTAL CONSIDERATIONS

A keen appreciation of developmental factors is key to an adequate understanding of the evolution of behavior, cognition, mental health, and mental disorders in children and adolescents. Although the entire human lifespan is shaped by the interplay between change and constancy, the theme of the progressive unfolding of human potential is the leitmotif from infancy through adolescence. These young age periods are characterized by rapid qualitative and quantitative shifts in neural, behavioral, and emotional organization in some areas, while at the same time other developmental domains remain relatively constant. This developmental framework is a hallmark of state-of-the-art basic, applied, and clinical research in child and adolescent populations, and provides the essential context for understanding child and adolescent mental health and disorder at molecular, molar, intrapsychic, interpersonal, and social organizational levels. Thus, the ultimate goals of neuroscientists, behavioral scientists, and applied and clinical scientists are complementary; these goals culminate in the clarification of the origins of child and adolescent mental disorders, and the development of new avenues for overcoming these disorders across the developmental epochs of infancy, childhood, and adolescence.

ELIGIBILITY

Applications may be submitted by public or private nonprofit or for-profit organizations such as universities, colleges, hospitals, laboratories, units of State or local governments, and eligible agencies of the Federal Government. Women and minority investigators are encouraged to apply.

APPLICATION CHARACTERISTICS

All applicants should take into account certain methodologic considerations:

Definition and Assessment. Most studies of child and adolescent psychopathology have used different terms and definitions. Validity and reliability of instruments are issues that deserve continued careful study. Mindful attention should be given to the instrumentation and methodologies used in assessing and classifying child and adolescent psychopathology and related conditions.

Wherever possible, standardized diagnostic and assessment methods should be used. These methods may include dimensional or categorical approaches. Commonly, a combination of these methods may be necessary. Obtaining assessment and/or diagnostic information from multiple informants and/or settings may be required. Careful attention must be paid to issues of handling different sources and types of information. It is important for applicants to address the issues of adequate diagnostic coverage by the

instrument(s), as well as interrater reliability and, to the extent possible, validity. The instrument(s) should make diagnoses according to recognized clinical criteria and should also permit the assessment of subclinical or variant conditions, such as subclinical depression.

Risk Factor Definition. The identification and operational definition of potential risk factors and correlates need to proceed with as much care as case definition. It is as important to attend to the reliability and validity of risk factor assessment as it is to the reliability and validity of case assessment. The unreliability of retrospective data on risk factors, which are often subject to poor recall and selective nonreporting, must also be addressed and steps taken to minimize bias.

Sampling. Special attention must be paid to the representativeness of subjects selected for study and to the selection and representativeness of appropriate control or comparison groups. It is important to know whether the groups being studied are representative of the universe of persons with the selected characteristics. Careful consideration of the relationship between subjects' gender and developmental stage, as these factors relate to the dependent and independent variables, is critical. Where appropriate, applicants must demonstrate that potential sources of selection bias, such as Berkson's bias, are not likely to occur in the proposed studies. In addition, applications must address questions of power and sample size, e.g., how many cases and controls are needed to establish statistically significant findings. Clear explanation and detailed descriptions of anticipated data analyses are required.

Basic Science. Wherever feasible, applicants should consider employment of basic science techniques and relevant animal models to clinical and epidemiologic research, e.g., screening for restriction fragment length polymorphisms (RFLP's) in pedigrees with heavy loading on suicidal behavior.

Treatment Studies. Applicants proposing studies of psychosocial treatment or pharmacotherapy should attend to additional methodologic considerations. Psychosocial treatment studies should have therapists with standardized training. Attention should be given to measures of adherence to the prescribed treatment. Pharmacotherapy studies should use standard research designs with randomized, double-blind, placebo-controlled conditions when possible. Attention should be focused on the choice of control groups (i.e., matching for relevant variables, use of multiple control groups). Pilot data assessing feasibility are encouraged.

Preventive or Promotive Interventions. Applicants proposing preventive or promotive intervention studies should also attend to additional methodologic concerns. Intervention studies should include a clearly articulated, empirically based, theoretical model that reflects putative processes underlying the psychopathology conditions, as well as a conceptual link among the chosen target group, intervention, and outcome measures. Research designs and procedures must be appropriate to the developmental and socio-demographic characteristics of the target group. In addition, follow-up of sufficient duration (e.g., two or more years) to determine the differential onset of the psychopathologic condition between the intervention groups(s) and the control group(s) is desirable. The proposal should include an assessment of the limitations, duration, and safety of the proposed intervention and must provide clear indication that the applicant organization has access to and experience in working with the proposed target population.

SPECIAL INSTRUCTIONS TO APPLICANTS REGARDING IMPLEMENTATION OF ADAMHA POLICIES CONCERNING INCLUSION OF WOMEN AND MINORITIES IN CLINICAL RESEARCH STUDY POPULATIONS

Applications/proposals for ADAMHA grants and cooperative agreements are required to include both women and minorities in study populations for clinical research, unless compelling scientific or other justification for not including either women or minorities is provided. This requirement is intended to ensure that research findings will be of benefit to all persons at risk of the disease, disorder, or condition under study. For the purpose of these policies, clinical research involves human studies of etiology, treatment, diagnosis, prevention, or epidemiology of diseases, disorders or conditions, including, but not limited to, clinical trials; and minorities include U.S. racial/ethnic minority populations (specifically: American Indians or Alaskan Natives, Asian/Pacific Islanders, Blacks, and Hispanics).

ADAMHA recognizes that it may not be feasible or appropriate in all clinical research projects to include representation of the full array of U.S. racial/ethnic minority populations. However, applicants are urged to assess carefully the feasibility of including the broadest possible representation of minority groups.

Applications should include a description of the composition of the proposed study population by gender and racial/ethnic group, and the rationale for the numbers and kinds of people selected to participate. This information should be included in the form PHS 398 in Section 2, A-D of the Research Plan AND summarized in Section 2, E, Human Subjects.

Applications should incorporate in their study design gender and/or minority representation appropriate to the scientific objectives of the work proposed. If representation of women or minorities in sufficient numbers to permit assessment of differential effects is not feasible or is not appropriate, the reasons for this must be explained and justified. The rationale may relate to the purpose of the research, the health of the subjects, or other compelling circumstances (e.g., if in the only study population available there is a disproportionate representation in terms of age distribution, risk factors, incidence/prevalence, etc., of one gender or minority/majority group).

If the required information is not contained within the application, the review will be deferred until it is provided. Peer reviewers will address specifically whether the research plan in the application conforms to these policies. If gender and/or minority representation/justification are judged to be inadequate, reviewers will consider this as a deficiency in assigning the priority score to the application.

All applications/proposals for clinical research submitted to ADAMHA are required to address these policies. ADAMHA funding components will not award grants that do not comply with these policies.

APPLICATION PROCEDURES

Application kits containing the necessary forms and instructions may be obtained from business offices or offices of sponsored research at most universities, colleges, medical schools, and other major research facilities. In addition, prospective applicants are strongly encouraged to contact one of the NIMH staff listed at the end of this announcement.

REVIEW

The Division of Research Grants, NIH, serves as a central point for receipt of applications for most discretionary PHS grant programs. Some of the areas outlined in this announcement are also of interest to the National Institute of Neurological Disorders and Stroke. In these areas of overlap, the standing referral guidelines will determine the appropriate research component within the NIH/ADAMHA system. Further, the applications will be referred to the appropriate study section/review committee for scientific and technical review, and assigned according to the established review referral guidelines. The IRGs, consisting primarily of non-Federal scientific and technical experts, will review the applications for scientific and technical merit. Notification of the review recommendations will be sent to the applicant after the initial review. Applications will receive a second-level review by the appropriate National Advisory Council, whose review may be based on policy considerations as well as scientific merit. Only applications recommended for approval by Council may be considered for funding.

APPLICATION RECEIPT AND REVIEW SCHEDULE

Grant applications will be accepted in accordance with the usual receipt dates for applications. Applications received after the receipt dates below are subject to assignment to the next review cycle or may be returned to the applicant:

Receipt Dates New/Renewal	Initial Review	Advisory Council Review	Earliest Start Date
June 1/July 1*	Oct./Nov.	Jan./Feb.	Apr. 1
Oct. 1/Nov. 1*	Feb./Mar.	May/June	July 1
Feb. 1/Mar. 1*	May/June	Sept./Oct.	Dec. 1

*Amended applications (new or renewal) are to be submitted on the latter dates. NRSA institutional and individual applications, AIDS applications, and Centers have differing receipt dates. For further information about these receipt dates, applicants should refer to the relevant announcements or contact an appropriate staff person listed at the end of this announcement.

TERMS AND CONDITIONS OF SUPPORT

Grant funds may be used only for expenses clearly related and necessary to conduct research projects, including both direct costs that can be identified specifically with the project and allowable indirect costs of the institution

(except research training grants, which are limited to a maximum of eight percent). All costs must be justified in terms of research objectives, methods, and designs which promise to yield generalizable knowledge and/or make a significant contribution to theoretical concepts. In fiscal year 1990, NIMH supported a total of $106.1 million of research in direct and related areas of child and adolescent mental disorders.

AWARD CRITERIA

Applications recommended for approval by Council will be considered for funding on the basis of overall scientific and technical merit of the research as determined by peer review, program needs and balance, and availability of funds.

STAFF CONSULTATION

Thomas Lalley, M.A.
Chief, Services Research Branch
Room 18C-14
Telephone: (301) 443-3364

Susan Solomon, Ph.D.
Chief, Violence and Traumatic Stress Research Branch
Room 18-105
Telephone: (301) 443-3728

Leonard Mitnick, Ph.D.
Chief, Basic Prevention and Behavioral Medicine Research Branch
Room 11C-06
Telephone: (301) 443-4337

Mary Ellen Oliveri, Ph.D.
Acting Chief, Personality and Social Processes Research Branch
Room 11C-10
Telephone: (301) 443-3566

Rodney Cocking, Ph.D.
Basic Behavioral and Cognitive Sciences Research Branch
Room 11C-10
Telephone: (301) 443-3942

Peter S. Jensen, M.D.
Chief, Child and Adolescent Disorders Research Branch
Room 10-104
Telephone: (301) 443-5944

Karen Bourdon, M.A.
Epidemiology and Psychopathology Research Branch
Room 10C-05
Telephone: (301) 443-3774

Doreen Koretz, Ph.D.
Acting Chief, Prevention Research Branch
Room 14C-03
Telephone: (301) 443-4283

To address correspondence to any of the above persons, use the following address:

Name
Room Number (noted above after each name)
Branch or Office Name (noted above in each program area)
National Institute of Mental Health
Parklawn Building
5600 Fishers Lane
Rockville, MD 20857

Grants Management questions should be directed to:

Mr. Stephen Hudak
Chief, Grants Management Section
Grants Management Branch
National Institute of Mental Health
5600 Fishers Lane, Room 7C-26
Rockville, MD 20857
Telephone: (301) 443-4456

SPECIAL EMPHASIS RESEARCH CAREER AWARD: THE DEMOGRAPHY AND ECONOMICS OF AGING

PA: PA-91-47

P.T. 34, CC; K.W. 0710010, 0413001, 0408006, 0417000

National Institute on Aging

The National Institute on Aging (NIA) solicits applications for SPECIAL EMPHASIS RESEARCH CAREER AWARDS (SERCA) from eligible institutions for interdisciplinary training and research support of demographers and economists seeking research careers in the demography or economics of aging. This SERCA is intended to foster the career development of junior and mid-level investigators with expertise in economics or demography who seek additional research skills and experience in the demography and/or economics of aging.

I. BACKGROUND

The aging of the population in the U.S., and in nations throughout the world, has raised many issues regarding the social and economic consequences of aging societies. The phenomena of aging populations is unprecedented; never before have improvements in mortality at the older ages been accompanied by sustained low fertility. As a consequence, research on the demography and economics of aging has recently gained much interest.

The demography of aging emphasizes research on the changing social and demographic structure of society as a whole. The aging of the population and, in particular, the rapid emergence of a large number of oldest-old persons, raises a complex set of questions about the future size, composition, and characteristics of the older population. Of special interest are the dynamics of various social phenomena of the elderly, including migration, intergenerational exchanges, living arrangements, and labor force participation. Also of interest is research designed to identify the health trajectories associated with changes in age-related disability and disease.

The economics of aging focuses on the economic consequences of population aging--for both older persons and for society at large. Of particular interest are the areas of health and retirement economics. At the individual level, research focuses on health services consumption, including nursing home and other long-term care service use, and on the financial status of older persons, measured in terms of productivity, savings, consumption, and retirement income. At the societal level, issues of public and private pension funding and health care financing emerge.

Research in the demography or economics of aging often lends itself to an interdisciplinary approach. Economists or demographers may need to acquire a thorough knowledge of, for example, the acute or long-term care health system, pension systems, epidemiology, biological and clinical aspects of aging, dynamics of family systems, etc. Assessments of the economic effects of an older population must be based not only on forecasts of sheer numbers of elderly, but on insights into the dynamics of population aging; similarly, demographic analyses might be made within economic and policy contexts.

The recruitment of qualified investigators and faculty is critical to an expansion of research in the area of demography and/or economics of aging. Research and training institutions also need to develop critical masses of qualified investigators in these areas.

II. PURPOSE OF THE AWARD

The NIA SERCA offers an opportunity for social scientists to acquire supplementary research skills and experience in order to pursue or enhance a research career in the demography and/or economics of aging. This SERCA is intended to foster the career development of researchers who are already well qualified in the areas of demography and/or economics by encouraging such individuals to acquire additional in-depth experience and skills needed for a career focused on the demography and/or economics of aging.

The award aims at a close and extended working relationship between a demographer or economist (the awardee) and one or more highly qualified investigators who have experience in aging research, who will serve as sponsor (and) advisor. The relationship should optimize the opportunity for interdis-ciplinary communication and collaboration in research on the demography and/or economics of aging. For the candidate, the relationship should develop the capacity to apply the knowledge and research methods of demography and/or economics to issues in aging. For the sponsoring institution, the relationship should stimulate awareness of the importance of demographic and/or economic tools for research on aging.

The NIA anticipates that this SERCA program will play a significant role in the development of researchers needed to assess the complex social and economic issues arising from the aging of the population. The SERCA program should also lead to an increase in the critical mass of these researchers within programs or departments of economics or demography.

III. PROVISIONS OF THE AWARD

This non-renewable award provides support for up to five years of full-time research and related activities.

A. PROGRAM

i. Developmental Phase: During the first year or two the awardee is expected to develop capabilities for conducting interdisciplinary research on the demography and/or economics of aging. The awardee's activities may include participation in any of the following: formal courses, ongoing research, workshops, symposia, and scientific and professional meetings.

ii. Project Phase: Beginning as early as possible, the awardee is expected to engage in a research project designed as a basis for more extended research. One hundred percent effort is expected on this award; at least 75 percent of an awardee's time must be spent in the actual conduct of research. Up to 25 percent of time may be spent on teaching and advising on research.

B. SALARY

The SERCA award is made to the applicant institution and provides up to $50,000 per year for full-time salary support plus fringe benefits. Supplementation of awardee's salary from non-Federal sources is allowable.

C. RESEARCH SUPPORT

In addition to the awardee's salary, up to a maximum of $10,000 in each of the first three years and up to a maximum of $20,000 in each of the subsequent two years may be requested for research expenses; *e.g.*, instrument development, data collection, analysis costs, technical assistance, consultant costs, domestic travel, publication costs, and other appropriate expenses that are essential to the proposed program.

D. TUITION

If essential to the awardee's individual development program, funds for tuition for training courses may be requested.

E. SPONSORING INSTITUTION

The sponsoring institution must be a domestic university, or comparable research institution with strong, well-established research programs in demography and/or economics. Already established programs in the demography and/or economics of aging are not required but will be considered advantageous. Existence of training programs in those areas will also be considered to be a positive factor. The sponsoring institution is expected to facilitate the program by providing space, resources and other support insofar as feasible. While the program should be situated primarily at a single institution, travel to, and stays at, other institutions for relevant experiences are permissible.

F. SPONSOR/ADVISOR

Throughout the grant period, the sponsoring institution is expected to arrange significant working relationships with the awardee through an advisor who will sponsor and oversee the proposed program, and who will make sure that the awardee will receive the proper experience for a future career in demography and/or economics of aging.

The advisor must be a social scientist with extensive research experience and must have a background in either the demography or economics of aging. The advisor should serve as a consultant or preferably as a collaborator.

Up to five percent of the primary advisor's salary will be allowed for the first two years.

IV. CRITERIA FOR ELIGIBILITY

A. THE CANDIDATE

1. The candidate must hold a Ph.D. or equivalent professional degree in a social, statistical, or mathematical science (e.g., economics, sociology, demography, epidemiology), and show clear evidence of expertise in demography or economics (e.g., by scholarly publications, or faculty or research appointments in these areas).

2. By the beginning date of the award, the candidate should have a minimum of two years post-doctoral research experience. Any deviation from this requirement must be clearly justified, e.g. by demonstrating evidence of exceptionally strong peer-reviewed publications (M.D./Ph.D. candidates are assumed to meet the two-year minimum requirement). This experience should include evidence of (a) clear intention to pursue research in demography and/or economics, and (b) an interest in either the demography or economics of aging. Successful candidates will have conducted high-quality research in their own discipline and have published in peer-reviewed journals. Previous pre- or postdoctoral fellowship experience in the demography or economics of aging is permissible.

3. The candidate agrees to inform the NIA for a period of five years subsequent to completion of the award regarding research activities, publications, grants or contracts, and academic status; and must agree to attend any scheduled meetings of awardees at NIA during the period of the award.

4. The candidate must be a citizen or noncitizen national of the United States or its possessions and territories or must hold a permanent residence visa at the time of application.

5. Applications from women and minority candidates are especially solicited.

6. SERCA applications may not be submitted concurrently with other PHS research career development applications (including any of the other K series), which would duplicate the provisions of the SERCA. This does not preclude the concurrent submission of a regular research project grant application.

B. THE SPONSORING INSTITUTION

1. The sponsoring institution must nominate the candidate on the basis of qualifications, interests, accomplishments, motivation, and potential for a research career in demography and/or economics of aging.

2. Evidence of the commitment of the institution to the candidate's research development must be provided (covering the advisor, space, resources, etc.) The sponsoring institution may or may not be the applicant's current employer. It is not essential for the sponsoring institution to commit itself to eventual placement of the candidate on its permanent faculty.

3. The background, qualifications, and commitment of the primary advisor must be described.

C. THE PROGRAM OF ACTIVITY

1. The candidate's proposal for training and research in the demography and/or economics of aging must be described in detail and fully justified.

2. For the research project, the general area must be defined and the research plan described in the grant application, e.g., identification and justification of the research problem; indication of possible study population(s), hypotheses, and variables; and strategies for analysis. It is anticipated that full details will be formulated (or re-formulated--see Supplementary Guidelines) during the first two years of the grant period.

V. INCLUSION OF MINORITIES AND WOMEN

NIH and ADAMHA policy is that applicants for NIH/ADAMHA clinical research grants and cooperative agreements will be required to include minorities and women in study populations so that research findings can be of benefit to all persons at risk of the disease, disorder or condition under study. Special emphasis should be placed on the need for inclusion of minorities and women in studies of diseases, disorders and conditions which disproportionately affect them. This policy is intended to apply to males and females of all ages. If women or minorities are excluded or inadequately represented in clinical

research, particularly in proposed population-based studies, a clear compelling rationale should be provided.

The composition of the proposed study population must be described in terms of gender and racial/ethnic group, together with a rationale for its choice. In addition, gender and racial/ethnic issues should be addressed in developing a research design and sample size appropriate for the scientific objectives of the study. This information should be included in the form PHS 398 in Section 2, A-D of the Research Plan AND summarized in Section 2, E, Human Subjects.

Applicants/offerors are urged to assess carefully the feasibility of including the broadest possible representation of minority groups. However, NIH recognizes that it may not be feasible or appropriate in all research projects to in-clude representation of the full array of United States racial/ethnic minority populations (i.e., Native Americans (including American Indians or Alaskan Natives), Asian/Pacific Islanders, Blacks, Hispanics). The rationale or studies on single minority population groups should be provided.

For the purpose of this policy, clinical research includes human biomedical and behavioral studies of etiology, epidemiology, prevention (and preventive strategies), diag-nosis, or treatment of diseases, disorders or conditions, including, but not limited to, clinical trials.

The usual NIH policies concerning research on human subjects also apply. Basic research or clinical studies in which human tissues cannot be identified or linked to individuals are excluded. However, every effort should be made to in-clude human tissues from women and racial/ethnic minorities when it is important to apply the results of the study broadly, and this should be addressed by applicants.

For foreign awards, the policy on inclusion of women applies fully; since the definition of minority differs in other countries, the applicant must discuss the relevance of research involving foreign population groups to the United States' populations, including minorities.

If the required information is not contained within the application, the review will be deferred until the information is provided.

Peer reviewers will address specifically whether the research plan in the application conforms to these policies. If the representation of women or minorities in a study design is inadequate to answer the scientific question(s) addressed AND the justification for the selected study population is inade-quate, it will be considered a scientific weakness or deficiency in the study design and will be reflected in assigning the priority score to the application.

All applications for clinical research submitted to NIH are required to address these policies. NIH funding components will not award grants or cooperative agreements that do not comply with these policies.

VI. MECHANISM OF SUPPORT

The administrative and funding mechanism to be used to support these studies will be the Special Emphasis Research Career Award (K01). The regulations (Code of Federal Regulations, Title 42, Part 52 and Title 45, Part 74) and policies that govern the research grant programs of the Public Health Services will prevail.

Applications for this SERCA will compete for funding with applications for other awards, as no funds have been set aside specifically for funding of SERCA applications. Such applications may be submitted for the regular NIH February 1, June 1, and October 1 receipt deadlines.

VII. APPLICATION PROCEDURES

A. STAFF CONTACT AND SUPPLEMENTARY GUIDELINES

Prospective applicants need to obtain Supplementary Guidelines and instructions, and to discuss their eligibility and proposed program of activities by contacting:

Richard Suzman
Demography of Aging (SERCA)
Behavioral & Social Research Program
National Institute on Aging
Building 31, Room 5C32
Bethesda, MD 20892-4500
Telephone: (301) 496-3136
Fax: (301) 402-0051

Questions regarding financial management should be addressed to:

Joe Ellis
Grants and Contracts Management Office
National Institute on Aging
Building 31, Room 5C07
Bethesda, MD 20892
Telephone: (301) 496-1472

B. SUBMISSION OF APPLICATION

Applications must be submitted on form PHS 398 (rev. 10/88, reprinted 9/89), available at most institutional business offices and from the Division of Research Grants (DRG), NIH, (301) 496-7441.

Applications should be carefully written to convey the maximum information to reviewers, in the clearest possible form, and with the minimum of verbiage. In line 2 of the face page of the application, applicants should enter "NIA SERCA: Demography and Economics of Aging, PA-91-47." Follow the "Supplementary Guidelines for Preparing Application, NIA-SERCA." (See section VII.A.) Mail the original completed application and four copies to:

Division of Research Grants
National Institutes of Health
Westwood Building, Room 240
Bethesda, MD 20892**

Send two copies of the application to:

Scientific Review Office
National Institute on Aging
Building 31, Room 5C-12
Bethesda, MD 20892-4500

C. APPLICATION RECEIPT AND REVIEW SCHEDULE

NIA-SERCA applications will be received three times per year according to the following schedule:

D. APPLICATION RECEIPT	COUNCIL REVIEW	START DATE
February 1	Sep/Oct	December 1
June 1	Jan/Feb*	April 1*
October 1	May*	July 1*

* of the year following application receipt

Amended applications also must be submitted for the same receipt dates.

VIII. REVIEW OF APPLICATIONS

Review of the applications for scientific and technical merit will be conducted by a subcommittee of the Neuroscience, Behavior and Sociology of Aging Review Committee, NIA. In this review, particular attention will be given to the candidate's prior training, experience, and publication record; clear intention to pursue aging research; career potential in demographic and/or economics of aging research; research career development plans; merit of the proposed research; appropriateness and qualifications of selected advisor(s) for proposed plans; and the environment (especially including the strength of the demography and economics program). The application must demonstrate that the award will enhance the candidate's development as an investigator in the demography and/or economics of aging and the sponsoring institution must show commitment to providing the adequate degree of support.

The initial review will result in recommendations for consideration by the National Advisory Council on Aging. Applications recommended for approval by the Advisory Council will be considered for funding on the basis of the overall merit of the proposal as determined by the Neuroscience, Behavior and

Sociology of Aging Review Committee, relevance of the proposal to the research objectives of the Institute, and availability of funds.

This program is described in the Catalog of Federal Domestic Assistance No. 93.866, Aging Research. Awards will be made under the authority of the Public Health Service Act, Title III, Section 301 (Public Law 78-410, as amended; 42 USC 241) and administered under PHS grants policies and Federal Regulations 42 CFR Part 52 and 45 CFR Part 74. This program is not subject to Health Systems Agency review.

INDIVIDUAL POSTDOCTORAL NATIONAL RESEARCH SERVICE AWARD FELLOWSHIPS IN RADIOLOGICAL SCIENCES RELATED TO CANCER

PA: PA-91-48

P.T. 22; K.W. 0720005, 0745020, 0706030, 0715035

National Cancer Institute

Application Receipt Dates: Jan. 10, May 10 and Sept. 10

I. BACKGROUND

There is a growing need for qualified and talented investigators in the radiological sciences who are concerned with problems related to the diagnosis and treatment of cancer. Diagnostic radiology is a medical discipline in which fundamental biological and cellular processes related to tumor evolution and tumor inhibition can be represented through a variety of new imaging technologies. Future advances in imaging will integrate links between anatomic structure, physiologic function, and biochemical activity that will elucidate the fundamental causes, detection, and metastasis of cancer. Currently, morphologic imaging is used for the detection and quantification of disease states as well as for the assessment of response to therapy. Radiation oncology, too, has become multi-disciplinary. Stereotactic radiosurgery, used for deep-seated brain lesions, involves neurosurgeons, radiation oncologists, physicists, and bioengineers. Systemic radiation therapy requires not only the physicians and physicists of the radiation therapy discipline, but also knowledge of the body's immune system, biochemistry, and state-of-the-art imaging technology. Dynamic conformal radiation therapy requires specialists in computer science, medical informatics, therapy treatment planning, and imaging technology. There is developing now a growing need in the radiological sciences for individuals who are cross-disciplinary in their approaches and solutions to the problems of diagnosis and treatment of the cancer patient.

An area of special interest is in the emerging discipline of medical informatics and its application to the field of cancer diagnosis and treatment. Medical informatics is concerned with the representation of knowledge and experience in a computerized format for reproducing advisory, critiquing, and educational functions; the storage, retrieval, and manipulation of data to support physician problem solving and reasoning; and the development of new understanding about the cognitive processes that are at work in a medical problem-solving environment. This multi-disciplinary field requires not only a knowledge of medicine, but a knowledge of engineering, computational linguistics, computer science, information science, statistics and cognitive science, as well as an intimate knowledge of the medical vocabulary and syntax, an understanding of the health issues being addressed, and knowing the appropriate questions to ask. Very few individuals in the medical sciences have received sufficiently broad training in information technology, inferential reasoning, quantitative methodology, imaging technology, and database design, coupled with a knowledge of the fundamental decision-making issues that exist in the socioeconomic environment in which health care is practiced.

II. GOALS AND SCOPE

The purpose of this Program Announcement is to stimulate qualified candidates to apply for post-doctoral fellowships leading to training in the radiological sciences that deal directly with cancer-related topics. Whenever possible, the curricula should approach problems related to cancer from an inter-disciplinary viewpoint---involving multiple disciplines such as diagnostic radiology, radiation oncology, physics, engineering, interpretation and visualization science, theoretical and biological foundations of anatomic structure, physiology, biochemistry, immunology, cognitive sciences, information sciences and computer science.

The Public Health Service (PHS) is committed to achieving the health promotion and disease prevention objectives of Healthy People 2000, a PHS-lead national activity for setting priority areas. This Program Announcement, Fellowships in the Radiological Sciences Related to Cancer, is related to the priority area of cancer. Potential applicants may obtain a copy of "Healthy People 2000" (Full Report: Stock No. 017-001-00474-0) or "Healthy People 2000" (Summary Report: Stock No. 017-001-00473-1) through the Superintendent of Documents, Government Printing Office, Washington, D.C. 20402-9325 (telephone 202-783-3238).

III. MECHANISM OF SUPPORT

The postdoctoral fellowships (F32) shall be funded by National Research Service Award (NRSA) on the basis of merit. All PHS and NIH grant policies will apply to applications received in response to this announcement. Before submitting an application, an applicant must arrange for appointment to an appropriate institution and acceptance by a sponsor, who will supervise the training and research experience. The institutional setting must have a strong department in the radiological sciences and indicate its awareness of and commitment to solving problems in the radiological disciplines related to cancer. Applications will be subjected to the same peer review process as all other individual postdoctoral fellowships.

Eligibility requirements. Individuals must be, at the time of application, citizens or noncitizen nationals of the United States who have been lawfully admitted to the United States for permanent residence and have in their possession an Alien Registration Receipt Card (I-151 or I-551). Individuals on temporary or student visas are not eligible. Individuals must have received, as of the beginning date of the appointment, a Ph.D., M.D., D.O., D.D.S., D.V.M., O.D., D.P.M., Sc.D., Eng.D., Dr. P.H., D.N.S., D.C., or equivalent degree from an accredited domestic or foreign institution. Certification by an authorized official of the degree-granting institution that all degree requirements have been met is also acceptable. Before submitting an application, an applicant must arrange for appointment to an appropriate institution and acceptance by a sponsor who will supervise the training and research experience. The institutional setting must have a strong department in the radiological sciences and indicate its awareness of and commitment to the application of medical informatics to the problems of the radiological disciplines. The candidate's sponsor must be a competent active investigator in the area of the proposed research activity and must personally supervise the candidate's research. The sponsor must document, in the application, the research training plan, the availability of staff and facilities to provide a suitable environment for performing high quality work, and the relevance to cancer.

Stipends and other training costs. The stipend level for the individual postdoctoral fellowship ranges from $18,600 to $32,300 depending on years of relevant experience subsequent to the award of the doctorate degree. Individual postdoctoral fellowships are made for project periods of up to three years. In addition, the applicant's institution/organization may request an institutional allowance up to $3,000 per year for supplies, equipment, travel, tuition, fees, medical insurance, and other training-related costs.

IV. APPLICATION AND REVIEW PROCEDURES

Applications must be submitted on form PHS 416-1 (rev. 4/89). These forms may be obtained from:

Office of Grants Inquiries
Division of Research Grants
National Institutes of Health
Westwood Building, Room 449
Bethesda, MD 20892

Applications will be accepted in accordance with the procedures specified in PHS 416-1 with usual receipt dates for new fellowship applications, i.e., Jan. 10, May 10, and Sept. 10. The review process will be completed approximately six months after the respective receipt dates. Applications received too late for one cycle of review will be held until the next receipt date.

Selection of awardees. Applications are subjected to a review process that is based upon two sequential levels of review. The initial review is performed by groups composed primarily of non-Federal scientists selected for their competence in particular scientific areas. The groups are called initial review groups. The second level of review is made by a committee of NIH staff members, selected from appropriate NIH institutes and divisions. Selection of successful candidates is made on the basis of the initial review group's

recommendation and percentile score, program interests, and the availability of funds.

V. INQUIRIES

Written and telephone inquiries about the goals and scope of this announcement may be directed to:

Sandra Zink, Ph.D.
Program Director
Radiation Research Program
National Cancer Institute
EPN/800
9000 Rockville Pike
Bethesda, MD 20892
Telephone: (301) 496-9360

For information regarding budgetary/administrative issues related to this Program Announcement, please contact:

Leo Buscher, Jr.
Chief, Grants Administration Branch
National Cancer Institute
National Institutes of Health
Executive Plaza South, Room 216
Bethesda, MD 20892
Telephone: (301) 496-7753

This program is described in the Catalog of Federal Domestic Assistance No. 93.398, Cancer Research Manpower. Awards are made under the authority of Section 487, Public Health Service Act as amended (42 USC 288) and administered under PHS Grant Policies and Title 42 of the Code of Federal Regulations, Part 66. This program is not subject to the intergovernmental review requirements of Executive Order 12372 or Health Systems Agency review.

**THE MAILING ADDRESS GIVEN FOR SENDING APPLICATIONS TO THE DIVISION OF RESEARCH GRANTS OR CONTACTING PROGRAM STAFF IN THE WESTWOOD BUILDING IS THE CENTRAL MAILING ADDRESS FOR THE NATIONAL INSTITUTES OF HEALTH. APPLICANTS WHO USE EXPRESS MAIL OR A COURIER SERVICE ARE ADVISED TO FOLLOW THE CARRIER'S REQUIREMENTS FOR SHOWING A STREET ADDRESS. THE ADDRESS FOR THE WESTWOOD BUILDING IS:

5333 Westbard Avenue
Bethesda, Maryland 20816

* U.S. G.P.O.:1991-281-826:20043